

# EUROPEAN PATENT OFFICE

## Patent Abstracts of Japan

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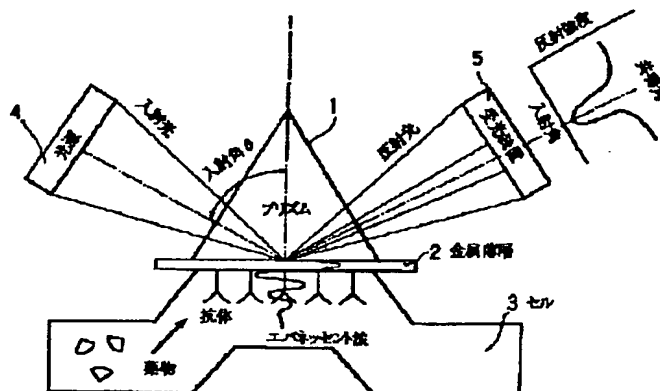
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TITLE : IMMUNITY MEASURING METHOD AND  
DEVICE UTILIZING SURFACE  
PLASMON RESONANCE  
PHENOMENON



ABSTRACT : PROBLEM TO BE SOLVED: To provide an immunity measuring method and device utilizing a surface plasmon resonance phenomenon which can detect the density of a medicine in a body fluid such as the urine and the blood, in a short time and at a high accuracy.

SOLUTION: A metal thin layer 2 having a fixed side surface fixing an antibody to a medicine, and a nonfixing side surface fixing no antibody to the medicine; a high refractive index prism 1 provided on the nonfixing side surface of the metal thin layer 2; and a cell 3 provided on the fixed side surface of the metal thin layer 2; are provided, and one side surface to compose the cell 3 generates an antigen antibody reaction between the antibody to the medicine on the fixed side surface, and a medicine in a tested liquid, by pouring the tested liquid to the cell 3 of a surface plasmon resonance phenomenon generating device being the fixed side surface of the metal thin layer 2. Then, the variation of the resonance angle in the surface plasmon resonance phenomenon before the pouring of the tested liquid and after the antigen antibody reaction is detected, so as to detect the amount of the medicine.

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